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Occupational hazard: Inequalities in labour market mismatch

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In this paper we depart from traditional skills-based measures of occupational mismatch. Whereas skill-based measures are typically non-hierarchical, and involve comparing an individual's skills to those required by their occupation, we devise a new hierarchical method. Specifically, we create two continuous, measures of occupational quality: an 'input' measure derived from the initial qualifications of others in an occupation, and an 'output' measure derived from the realized wages of others, alongside a corresponding measure of individual ability. We use these detailed, comparable measures to examine the extent to which individuals mismatch into occupations, for the first time in the literature. We explore the nature of mismatch throughout the ability distribution, focusing on systematic differences by socio-economic status (SES) and gender. We find low SES individuals are employed in lower wage and lower qualification occupations compared to their similarly qualified peers. Meanwhile, while females match to occupation groups with higher achieving employees than males, they are employed in lower wage occupations. Educational routes between compulsory education and occupations at age 25 can explain around 33% of these SES gaps among high achievers, but persistent sizeable difference remain, conditional on all post-16 activity. By contrast the gender gap in mismatch remains stable, suggesting that education choices are not driving the differences. Instead, industry worked in accounts for most of the gender gap, though only among low achievers.

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Highlights

- We ask which types of individuals are more likely to “undermatch” in their occupation, by entering a lower quality occupation than might be expected given their qualifications? We use data from Next Steps to investigate this across the entire spectrum of achievement and jobs.
- We measure occupation quality according to i) the education levels of workers in that occupation (where the highest quality occupations are those with the most highly educated workers), and ii) the average earnings of the occupation (where the highest quality occupations are those with the highest earning workers)
- We find that individuals from low SES backgrounds are more likely to “undermatch”, working in occupations that are lower ranked in terms of both earnings, and education levels than those from high SES backgrounds with the same qualifications.
- In contrast, while women are more likely to work in lower paying occupations than men across the achievement distribution, they also work in occupations that have, on average, more qualified workers.
- We find that these gaps cannot be explained by prior attainment, experience, non-cognitive factors such as academic self-confidence, or a range of measures of occupational preferences. Only industry matters, for the gender gap in occupations.

Why does this matter?

Understanding which types of young people enter lower quality occupations than they could have given their qualifications has implications for both social mobility and the gender pay gap. We should target low income and female students with better careers information, such as on the occupations that match their attainment profile, and the earnings associated with different occupations.